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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/899,878	07/06/2001	Francois Martin	PHFR 000074	3333
24737 . 7.	590 07/12/2005	EXAMINER		
	ELLECTUAL PROP	LEE, Y YOUNG		
P.O. BOX 3001 BRIARCLIFF MANOR, NY 10510			ART UNIT	PAPER NUMBER
BRIARCLIFF	MANOR, NT 10510	•	2613	

DATE MAILED: 07/12/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

		Application No.	Applicant(s)		
Office Action Summary		09/899,878	MARTIN, FRANCOIS		
		Examiner	Art Unit		
		Y. Lee	2613		
Period fo	The MAILING DATE of this communication ap or Reply	pears on the cover sheet with the o	correspondence address		
THE I - Exter after - If the - If NO - Failu Any	ORTENED STATUTORY PERIOD FOR REPL MAILING DATE OF THIS COMMUNICATION. nsions of time may be available under the provisions of 37 CFR 1. SIX (6) MONTHS from the mailing date of this communication. period for reply specified above is less than thirty (30) days, a reprepriod for reply is specified above, the maximum statutory period to reply within the set or extended period for reply will, by statutively received by the Office later than three months after the mailing patent term adjustment. See 37 CFR 1.704(b).	136(a). In no event, however, may a reply be tirely within the statutory minimum of thirty (30) day will apply and will expire SIX (6) MONTHS from e, cause the application to become ABANDONE	nely filed  /s will be considered timely.  I the mailing date of this communication.  D (35 U.S.C. § 133).		
Status	•				
1)⊠	Responsive to communication(s) filed on 16 J	lune 2005.			
2a)⊠	This action is <b>FINAL</b> . 2b) This	s action is non-final.			
3)□	Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under <i>Ex parte Quayle</i> , 1935 C.D. 11, 453 O.G. 213.				
Dispositi	on of Claims		·		
4)⊠ 5)□ 6)⊠ 7)□	Claim(s) 1-7 is/are pending in the application.  4a) Of the above claim(s) is/are withdra  Claim(s) is/are allowed.  Claim(s) 1-7 is/are rejected.  Claim(s) is/are objected to.  Claim(s) are subject to restriction and/o	awn from consideration.			
Applicati	on Papers				
10)	The specification is objected to by the Examina The drawing(s) filed on is/are: a) accomposite and applicant may not request that any objection to the Replacement drawing sheet(s) including the correct The oath or declaration is objected to by the E	cepted or b) objected to by the drawing(s) be held in abeyance. Section is required if the drawing(s) is ob	e 37 CFR 1.85(a). njected to. See 37 CFR 1.121(d).		
Priority u	ınder 35 U.S.C. § 119				
12)⊠ a)[	Acknowledgment is made of a claim for foreign All b) Some * c) None of:  1. Certified copies of the priority documen 2. Certified copies of the priority documen 3. Copies of the certified copies of the priority documen application from the International Bureasee the attached detailed Office action for a list	ts have been received. ts have been received in Applicationity documents have been received au (PCT Rule 17.2(a)).	ion No ed in this National Stage		
Attachmen	t(s)				
2)  Notic 3) Inform	e of References Cited (PTO-892) e of Draftsperson's Patent Drawing Review (PTO-948) nation Disclosure Statement(s) (PTO-1449 or PTO/SB/08 r No(s)/Mail Date	4) Interview Summary Paper No(s)/Mail D  5) Notice of Informal F  6) Other:			

#### **DETAILED ACTION**

## Response to Amendment

1. Applicant's request for reconsideration of the finality of the rejection of the last.

Office action is persuasive and, therefore, the finality of that action is withdrawn.

#### **Priority**

2. Receipt is acknowledged of papers submitted under 35 U.S.C. 119(a)-(d), which papers have been placed of record in the file.

## Claim Rejections - 35 USC § 102

3. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless -

- (e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.
- 4. Claims 1 and 5-7 are rejected under 35 U.S.C. 102(e) as being anticipated by De Haan et al (6,278,736).

The applied reference has a common assignee with the instant application.

Based upon the earlier effective U.S. filing date of the reference, it constitutes prior art under 35 U.S.C. 102(e). This rejection under 35 U.S.C. 102(e) might be overcome either by a showing under 37 CFR 1.132 that any invention disclosed but not claimed in the reference was derived from the inventor of this application and is thus not the invention "by another," or by an appropriate showing under 37 CFR 1.131.

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De Haan et al, in Figures 1, 6, and 7, discloses the same method of processing an input digital video signal comprising video frames so as to provide a modified digital video signal for a motion estimation step (Fig. 6) as specified in claim 1 of the present invention, the processing method comprises the steps of computing a histogram (e.g. col. 15) of luminance or chrominance of original values associated with pixels belonging to a video frame (Fig. 2), analyzing the histogram to provide histogram parameters (e.g. peaks), and correcting the original pixel values (e.g. Eq. 20 and 21) on the basis of the histogram parameters to provide modified pixel values, which yields the modified digital video signal to be used by the motion estimation step (e.g. Eq. 12 and 13).

With respect to claims 5-7, De Haan et al also discloses the video encoder comprising a motion estimator ME for receiving the modified digital video signal and for supplying motion vectors D, a data compressor (e.g. MPEG) for receiving the input digital video signal and for deriving an encoded digital video signal from the motion vectors (see section. V).

### Claim Rejections - 35 USC § 103

5. Claims 2-4 are rejected under 35 U.S.C. 103(a) as being obvious over De Haan et al in view of Hampson et al (Motion Estimation in the Presence of Illumination Variations) for the same reasons as set forth in section 9 of the previous office action, date 7/15/04.

The applied reference has a common assignee with the instant application.

Based upon the earlier effective U.S. filing date of the reference, it constitutes prior art only under 35 U.S.C. 102(e). This rejection under 35 U.S.C. 103(a) might be overcome

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by: (1) a showing under 37 CFR 1.132 that any invention disclosed but not claimed in the reference was derived from the inventor of this application and is thus not an invention "by another"; (2) a showing of a date of invention for the claimed subject matter of the application which corresponds to subject matter disclosed but not claimed in the reference, prior to the effective U.S. filling date of the reference under 37 CFR 1.131; or (3) an oath or declaration under 37 CFR 1.130 stating that the application and reference are currently owned by the same party and that the inventor named in the application is the prior inventor under 35 U.S.C. 104, together with a terminal disclaimer in accordance with 37 CFR 1.321(c). This rejection might also be overcome by showing that the reference is disqualified under 35 U.S.C. 103(c) as prior art in a rejection under 35 U.S.C. 103(a). See MPEP § 706.02(l)(1) and § 706.02(l)(2).

Although De Haan et al discloses a correcting step (Eq. 12, 13, 20, 21) and a step of filtering (e.g. LPF) the modified digital video signal so as to provide a filtered modified digital video signal for the motion estimation step, it is noted De Haan et al differs from the present invention in that it fails to particularly disclose any sub-analyzing steps as specified in claim 2-4. Hampson et al, however, teaches the concept of such well known sub-steps of calculating a translation parameter g and a width variation parameter h of the histogram, and the correcting step (Eq. 1) is adapted to derive the modified pixel values from a sum and a product of the original pixel values and the parameters (h and g).

Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made, having both the references of De Haan et al and

Hampson et al before him/her, to exploit the common histogram manipulation techniques as taught by Hampson et al in the processing method of De Haan et al in order to allow the prediction error to be largely reduced in comparison with the standard pel-recursive motion estimation algorithm.

# Response to Arguments

6. Applicant's arguments with respect to claims 1-7 have been considered but are moot in view of the new ground(s) of rejection.

#### Conclusion

- 7. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. Yokoyama discloses motion compensation estimating device achieving improved motion compensation.
- 8. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of

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the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Y. Lee whose telephone number is (571) 272-7334. The examiner can normally be reached on (571) 272-7334.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Mehrdad Dastouri can be reached on (571) 272-7418. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

**Primary Examiner** Art Unit 2613